ABSTRACT

Since a 5 GHz-band broadband has a frequency twice that of 2.4GHz, the parasitic capacitance greatly influences deterioration in isolation of a switching device used in this frequency region. Therefore, to improve isolation, a shunt FET is added to the device. The switching device also includes a protecting element that has a first n^+-type region, an insulating region and a second n^+-type region. This protecting element is connected in parallel between two electrodes of the shunt FET. Since electrostatic charges are discharged between the first and second n^+-type regions, the electrostatic energy reaching an operation region of the shunt FET can be reduced without an increase in parasitic capacitance.